Cholera Bug in India

2867. PROF. M. SANKARALINGAM: Will the Minister of HEALTH AND FAMILY WELFARE be pleased to state:

(a) whether it is a fact that lethal Cholera bug are prevalent in India;

(b) in which part of India such bug are active and what damage has been caused to the life of men, women and animals in the country; and

(c) the steps taken by the Health Department to arrest the spread of the Cholera bug?

THE MINISTER OF STATE OF THE MINISTRY OF HEALTH AND FAMILY WELFARE (SHRI DALIT EZHILMALAI) : (a) and (b) Cholera is an acute diarrhoeal disease caused by Vibrio Cholerar which spreads through Contaminated water an food, poor environmental sanitation and personal hygiene. The disease is endemic in the country and sporadic cases are reported throughout the year, with seasonal increase during the summer and monsoon periods.

(c) The control and prevention of cholera requires availability of uncontaminated safe drinking water, hygienic disposal of human faeces and hyginene. Under the Rajiv Gandhi National Drinking Water Mission, Government of India is providing safe water and undertaking sanitation programme. The National Surveillance Programme for Communicable Diseases (NSPCD) has also been launched in selected districts for detection of early warning signals of outbreaks due to communicable diseases, including cholera, and rapid response system established for prevention and control of these outbreaks.

Gene Therapy for Medical Treatment

2868. SHRI PARMESHWAR KUMAR AGARWALLA: Will the Minister of HEALTH AND FAMILY WELFARS be pleased to state:

(a) whether WHO has suggested development of gene therapy to make medical treatment more effective;

(b) if so, what is the position in the medical research in this regard as far as India is concerned; and

(c) how soon an effective gene therapy methodology is expected to achieve a break through?

THE MINISTER OF STATE OF THE MINISTRY OF HEALTH AND FAMILY WELFARE (SHRI DALIT EZHILMALAI) :(a) The World Health Organisation in its overview of the Human Genetics Programme (HGP) published in 1999 has made the following general statement:

A WHO Scientific Group on the Control of Hereditary Diseases held in 1993 strongly recommended further development of genetic approaches to the control of various diseases and for health improvement. The preparation and international dissemination of information on genetic problems and possible strategies for disease control is an essential component of HGP.

Such information is updated and revised at the regularly organised WHO meetings in the light of research developments and experience of ongoing national programmes.

(b) In India there are several centres where basic research into gene-therapy is being conducted. This research is primarily focussed on developing the technology for efficient gene delivery into animals. The diseases that are being targeted are infectious diseases or acquired disorders such as cancer. No human clinical trails have yet been conducted in India using genetic therapies. Hence the gene therapy